Kentucky Public Health
Prevent. Promote. Protect.

TESTING FOR ZIKA VIRUS INFECTION

Zika virus testing strategies have been changing over the past six months based on evolving scientific findings. The Kentucky Department for Laboratory Services (DLS) has been conducting all Zika virus PCR and IgM testing on site since May 2016. Local and state health department staff can assist with approval and lab submission.

If a provider would like to test for Zika virus based on travel history or clinical presentation:

- DLS will perform **PCR testing on serum and urine (if accompanied by a patient-matched serum specimen) for 14 days after onset of symptoms**.
    - A negative PCR means that virus is not present in the specimen at the detection level of the assay.
        - A serum PCR may be negative if done more than 7 days after symptom onset.
        - A urine PCR may be negative if testing is done more than 14 days after symptom onset.
- DLS will perform Zika virus **IgM testing 2-12 weeks after travel**. IgM testing can have false positive results due to cross reactivity with other flaviviruses, therefore a positive Zika IgM test result by itself is NOT a confirmation of recent infection. Confirmation of all positive or equivocal results requires additional testing by CDC. A negative IgM result does not rule out Zika infection, if testing is done early in the convalescent period (before IgM levels are detected) or > 12 weeks after infection has occurred.

Testing is recommended for:

- **Women who may have been exposed to Zika virus during pregnancy**, including:
    - Pregnant women with a history of travel to an area with Zika virus transmission who report 2 or more symptoms consistent with Zika infection (fever, rash, arthralgia, conjunctivitis) during or within two weeks of travel.
    - Pregnant women without symptoms who traveled or resided in a Zika-affected area. Testing should be completed 2-12 weeks after travel to increase the likelihood of serologic detection.
    - Females who traveled to or resided in a Zika-affected area during pregnancy who just delivered an infant without signs of microcephaly or intracranial calcifications and report clinical illness compatible with Zika during pregnancy.
- **Infants** with microcephaly or intracranial calcifications born to women who traveled or resided in a Zika-affected area while pregnant; infants born to mothers with positive or inconclusive test results for Zika infection; and infants demonstrating symptoms of Zika within two weeks of travel or in first two weeks of life if mother traveled during pregnancy.

- **Adults and children** who traveled to a Zika-affected area within the past 2 weeks and demonstrate two or more symptoms compatible with Zika virus infection.

Continue to educate your patients:

- Pregnant women or those planning a pregnancy should postpone travel to Zika-affected areas.
- All travelers should use enhanced mosquito precautions when traveling and for three weeks after return.
- Male travelers should wear condoms after departure from a Zika-affected area for eight weeks if asymptomatic, six months if symptomatic, or for the duration of pregnancy of a sexual partner.